

264-1057

8/21/2008

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UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
WASHINGTON, D.C. 20460



OFFICE OF  
PREVENTION, PESTICIDES  
AND TOXIC SUBSTANCES

August 21, 2008

Danielle Larochelle  
Bayer CropScience  
PO Box 12014  
2 TW Alexander Dr.  
Research Triangle Park, NC 27709

Re: Aeris Seed-Applied Insecticide/Nematicide, EPA Reg # 264-1057  
label amendment submitted 5/8/2007 2/14/08, revised 5/19/08  
accepted

Dear Ms. Larochelle,

The revised labeling referenced above, submitted in connection with the registration under the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA), as amended, is ACCEPTABLE. This label amendment adds use as a seed treatment on soybeans. Since use on soybeans is already registered as a seed treatment with both thiodicarb and imidacloprid this amendment was mainly a matter of combining the label text for each chemical.

Submit two (2) copies of your final printed labeling incorporating the above changes prior to releasing your product for shipment. If the above provisions are not complied with the registration will be subject to cancellation in accordance with FIFRA Section 6(e). Your release for shipment of the product bearing the amended labeling constitutes acceptance of these conditions.

A copy of the label stamped "accepted" is enclosed for your records.

Yours truly,

Thomas C. Harris  
Insecticide / Rodenticide Branch  
Registration Division (7505C)  
Office of Pesticide Programs  
(703) 308-9423  
[harris.thomas@epa.gov](mailto:harris.thomas@epa.gov)

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# RESTRICTED USE PESTICIDE

Due to Avian, Aquatic and Small Mammal Toxicity  
For retail sale to and use only by Certified Applicators or persons  
under their direct supervision and only for those uses covered  
by the Certified Applicator's Certification.

# AERIS™ Seed-Applied Insecticide/Nematicide

## For Use Only in Commercial Seed Treatment Equipment

### ACTIVE INGREDIENTS

**THIODICARB:** Dimethyl N, N' [thiobis[(methylimino)carbonyloxy]]bis[ethanimidothioate] ..... 24% by wt.

**IMIDACLOPRID:** 1-[(6-Chloro-3-pyridinyl)methyl]-N-nitro-2-imidazolidinimine] ..... 24% by wt.

**INERT INGREDIENTS** ..... 52% by wt.

Contains 2.5 pounds active imidacloprid per U.S. gallon

Contains 2.5 pounds active thiodicarb per U.S. gallon

EPA Reg. No. 264-1057

EPA Est. No. 264-MO-02

## KEEP OUT OF REACH OF CHILDREN

# CAUTION

For **MEDICAL** And **TRANSPORTATION** Emergencies **ONLY** Call 24 Hours A Day 1-800-334-7577  
For **PRODUCT USE** Information Call 1-866-99BAYER (1-866-992-2937)

### FIRST AID

Thiodicarb is an N-methyl carbamate.

<b>IF SWALLOWED:</b>	<ul style="list-style-type: none"> <li>• Call a poison control center or doctor immediately for treatment advice.</li> <li>• Have person sip a glass of water if able to swallow.</li> <li>• Do not induce vomiting unless told to do so by a poison control center or doctor.</li> <li>• Do not give anything by mouth to an unconscious person.</li> </ul>
<b>IF ON SKIN OR CLOTHING:</b>	<ul style="list-style-type: none"> <li>• Take off contaminated clothing.</li> <li>• Rinse skin immediately with plenty of water for 15-20 minutes.</li> <li>• Call a poison control center or doctor for treatment advice.</li> </ul>
<b>IF INHALED:</b>	<ul style="list-style-type: none"> <li>• Move person to fresh air.</li> <li>• If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably mouth-to-mouth if possible.</li> <li>• Call a poison control center or doctor for further treatment advice.</li> </ul>
<b>IF IN EYES:</b>	<ul style="list-style-type: none"> <li>• Hold eye open and rinse slowly and gently with water for 15-20 minutes.</li> <li>• Remove contact lenses, if present, after the first 5 minutes, then continue rinsing.</li> <li>• Call a poison control center or doctor for treatment advice.</li> </ul>

**For MEDICAL Emergencies Call 24 Hours A Day 1-800-334-7577.**

**Have the product container or label with you when calling a poison control center or doctor or going for treatment.**

### SIGNS AND SYMPTOMS OF OVEREXPOSURE

Salivation, Muscle tremors, Nausea, Watery eyes, Difficult breathing, Vomiting, Pinpoint eye pupils, Excessive sweating, Diarrhea, Blurred vision, Abdominal cramps, Weakness, Headache.

**IN SEVERE CASES, CONVULSIONS, UNCONSCIOUSNESS, AND RESPIRATORY FAILURE MAY OCCUR.**

**ANTIDOTE STATEMENT:** ATROPINE SULFATE IS HIGHLY EFFECTIVE AS AN ANTIDOTE. See NOTE TO PHYSICIAN.

ACCEPTED  
8/21/2008

Under the Federal Insecticide, Fungicide,  
and Rodenticide Act, as amended, for the  
pesticide registered under:

264-1057

EPA. Reg. No: \_\_\_\_\_

000264-01057.20080513.  
AERISSeedAppliedInsecticideN  
ematicide.pdf

**GENERAL**

Contact a physician immediately in all cases of suspected poisoning. If breathing stops, establish an airway, start artificial respiration, and provide oxygen. Make certain to remove all sources of continuing contamination. Remove clothing and wash skin and hair immediately with large amounts of water. Transport the patient to a physician or hospital immediately and SHOW A COPY OF THIS LABEL TO THE PHYSICIAN. If poisoning is suspected in animals, contact a veterinarian.

**NOTE TO PHYSICIAN**

All treatments should be based on observed signs and symptoms of distress in the patient. Overexposure to materials other than this product may have occurred.

This product contains an N-methyl carbamate insecticide, which is a cholinesterase inhibitor. Overexposure to this substance may cause toxic signs and symptoms due to stimulation of the cholinergic nervous system. These effects of overexposure are spontaneously and rapidly reversible. Gastric lavage may be used if this product has been swallowed. AERIS™ Seed-Applied Insecticide/Nematicide poisoning may occur rapidly after ingestion and prompt removal of stomach contents is indicated.

Specific treatment consists of parenteral atropine sulfate. Caution should be maintained to prevent over atropinization. Mild cases may be given 1 to 2 mg intramuscularly every 10 minutes until full atropinization has been achieved and repeated thereafter whenever symptoms reappear. Severe cases should be given 2 to 4 mg intravenously every 10 minutes until fully atropinized, then intramuscularly every 30 to 60 minutes as needed to maintain the effect for at least 12 hours. Dosages for children should be appropriately reduced. Complete recovery from overexposure is to be expected within 24 hours.

Narcotics and other sedatives should not be used. Further, drugs like 2-PAM (pyridine-2-aldoxime methiodide) are NOT recommended unless organophosphate intoxication is also suggested.

To aid in confirmation of a diagnosis, urine samples should be obtained within 24 hours of exposure and immediately frozen. Analyses will be arranged by Bayer CropScience.

Consultation on therapy can be obtained at all hours by calling the Bayer CropScience emergency number: 1-800-334-7577.

**PRECAUTIONARY STATEMENTS**

**HAZARDS TO HUMANS AND DOMESTIC ANIMALS**

**CAUTION**

Harmful if swallowed, absorbed through skin, or inhaled. Causes moderate eye irritation. Avoid contact with eyes, skin, or clothing. Avoid breathing fumes. Prolonged or frequently repeated skin contact may cause allergic reaction in some individuals. Remove contaminated clothing and wash before reuse.

**PERSONAL PROTECTIVE EQUIPMENT (PPE)**

Workers involved with treating the seed (e.g. connecting and disconnecting hoses and transfer pumps, mixing, equipment calibration, etc.) and others exposed to the concentrate, and cleaners/repairers of seed treatment equipment must wear a long-sleeve shirt and long pants, shoes plus socks, chemical resistant gloves made out of any waterproof material, and a dust/mist filtering respirator (MSHA/NIOSH approval number prefix TC-21C) or a NIOSH approved respirator with any R, P, or HE filter.

Baggers and bag sewers must wear a long-sleeve shirt and long pants, shoes plus socks, chemical resistant gloves made out of any waterproof material, and a dust/mist filtering respirator (MSHA/NIOSH approval number prefix TC-21C) or a NIOSH approved respirator with any R, P, or HE filter.

**User Safety Recommendations**

- Users should wash hands before eating, drinking, chewing gum, using tobacco or using the toilet.
- Users should remove clothing immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing.
- Users should remove PPE immediately after handling this product. Wash the outside of gloves before removing. As soon as possible, wash thoroughly and change into clean clothing.
- Discard clothing and other absorbent materials that have been drenched or heavily contaminated with this product's concentrate. Do not reuse them.
- Follow manufacturer's instructions for cleaning/maintaining PPE. If no such instructions for washables, use detergent and hot water. Keep and wash PPE separately from other laundry.

**ENVIRONMENTAL HAZARDS**

This product is highly toxic to birds and aquatic invertebrates and toxic to fish and mammals. Do not contaminate water when disposing of equipment washwater or rinsate.

# DIRECTIONS FOR USE

## RESTRICTED USE PESTICIDE

It is a violation of Federal Law to use this product in a manner inconsistent with its labeling.

### GENERAL DIRECTIONS

For use only in commercial seed treatment equipment. Not for use in hopper box, planter box, slurry box, or other farmer-applied applications.

Read the entire label and observe all label directions and precautions before use. Do not use this product except as directed on this label or on other Bayer CropScience supplemental labeling for this product.

### COMPATIBILITY

It is essential that before using AERIS™ Seed-Applied Insecticide/Nematicide in any tank mixture the compatibility of the mixture be established. Add AERIS™ Seed-Applied Insecticide/Nematicide at the recommended label rate to a clean quart jar containing approximately one-half the amount of water intended for a final slurry application rate. Next, follow with all other tank mix components that will be used in the total slurry application. Add last the remaining balance of water. The total amount of volume is determined by the seed size and how much is necessary to ensure complete and uniform coverage and distribution on the seed, as well as the type of commercial seed treating application equipment that will be used

DO NOT USE MIXTURES THAT CURDLE, PRECIPITATE, OR GEL. FOR BEST RESULTS, TANK MIXTURES SHOULD BE USED IMMEDIATELY AFTER MIXING WITH ADEQUATE AGITATION.

**NOTE:** Thiodicarb is hydrolytically sensitive to degradation of active ingredient by strong acids AND strong bases. DO NOT ADD AERIS™ SEED-APPLIED INSECTICIDE/NEMATICIDE TO WATER WITH pH VALUES BELOW 3.0 OR ABOVE 8.5. If necessary, water should be buffered within this range before adding AERIS™ Seed-Applied Insecticide/Nematicide. Degradation can cause reduced effectiveness, plant phytotoxicity and increased handling hazards.

### DIRECTIONS FOR SEED TREATMENT

All seed treated with this product must be colored with an EPA-approved dye or colorant that imparts an unnatural color to the seed to help prevent the inadvertent use of treated seed for food, feed or oil purposes.

## COTTON (Delinted Seed Only)

### For Early Season Protection Against Certain Sucking and Lepidopteran Insects and Certain Nematodes:

AERIS Seed-Applied Insecticide will provide protection of cotton seedlings against injury by early season thrips, aphids, lygus, fleahoppers, cutworms and reniform and root knot nematodes. Where the specific application rate is desired on an individual seed basis apply 0.375 mg. imidacloprid a.i. (active ingredient) and 0.375 mg. thiodicarb a.i. per seed prior to planting as a slurry treatment so as to ensure thorough coverage. Otherwise apply 25.6 fluid ounces product per hundred pounds of seed. Do not apply more than 25.6 fluid ounces per hundredweight of seed.

Do not exceed a total of 5.4 pounds thiodicarb a.i. per acre per season for seed treatment and foliar applications combined. In Arizona and California, do not exceed a total of 1.8 pounds thiodicarb a.i. per acre per season for seed treatment and foliar applications combined.

Do not exceed a total of 0.5 pounds imidacloprid a.i. per acre per season for seed treatment, soil, and foliar applications combined.

## SOYBEAN

### For Early Season Protection from Certain Nematodes and Certain Insects Attacking Soybean:

AERIS Seed Applied Insecticide/Nematicide will provide protection from early season injury to seeds and seedlings by nematodes attacking soybean, such as soybean cyst nematode and root knot nematode, and from damage caused by seed corn maggot, soybean aphids and over-wintering bean leaf beetles, and will help suppress the spread of certain viruses. Apply 3.2 – 6.4 fl. oz. of product per hundredweight of seed prior to planting as a slurry treatment so as to ensure thorough coverage. Use higher rates to provide increased length of protection and for heavy insect pressure.

Do not exceed a total of 3.0 pounds thiodicarb a.i. (active ingredient) per acre per season for seed treatment and foliar applications combined.

Do not exceed a total of 0.38 pound imidacloprid a.i. per acre per season for seed treatment, soil and foliar applications combined.

Do not allow grazing or feed soybean forage or hay to livestock.

## SEED BAG LABEL REQUIREMENTS

The Federal Seed Act requires that bags containing treated seeds shall be labeled with the following statements:

- This seed has been treated with thiodicarb and imidacloprid.
- Do not use for food, feed or oil purposes.

In addition, the U.S. Environmental Protection Agency requires the following statements on bags containing seed treated with AERIS™ Seed-Applied Insecticide/Nematicide:

- Store away from food and feedstuffs.
- Do not allow children, pets, or livestock to have access to treated seeds.
- Wear long-sleeved shirt, long pants, and chemical resistant gloves made out of any waterproof material when handling treated seed.
- For cotton, growers must not exceed a total of 5.4 pounds thiodicarb a.i. (active ingredient) per acre per season for seed treatment and foliar applications combined. In Arizona and California, do not exceed a total of 1.8 pounds thiodicarb a.i. per acre per season for seed treatment and foliar applications combined. Growers must not exceed a total of 0.5 pounds imidacloprid a.i. per acre per season for seed treatment, soil, and foliar applications combined.
- For soybean, growers must not exceed a total of 3.0 pounds thiodicarb a.i. per acre per season for seed treatment and foliar applications combined. Do not exceed a total of 0.38 pound imidacloprid a.i. per acre per season for seed treatment, soil and foliar applications combined. Do not allow grazing or feed soybean forage or hay to livestock.
- Treated seed must be planted into the soil at a depth greater than 1 inch. Treated seeds exposed on soil surface may be hazardous to birds or other wildlife. Cover or collect treated seeds that are spilled during loading and in areas such as row ends.
- Dispose of all excess treated seed by burial away from bodies of water.
- Dispose of seed packaging in accordance with local requirements.
- Do not contaminate bodies of water when disposing of planting equipment wash water.
- Plant AERIS™ Seed-Applied Insecticide/Nematicide treated seed based upon local production and Best Management Practices as recommended by your state's Crop Specialist, IPM Coordinator or Extension Nematologist. For cottonseed only, in soils with a history of high nematode populations, an at-plant application of TEMIK® brand 15G Aldicarb Pesticide is recommended.
- Always calibrate planters prior to planting to ensure the desired seeding rate.

## STORAGE AND DISPOSAL

Do not contaminate water, food or feed by storage or disposal.

### PESTICIDE STORAGE

Store unused product in a cool, ventilated, dry area. Do not allow prolonged storage in areas where temperatures frequently exceed 115°F (46°C) or go below 35°F (2°C). NEVER TRANSFER THIS PRODUCT TO ANOTHER CONTAINER FOR STORAGE.

### PESTICIDE DISPOSAL

Improper disposal of excess pesticides or rinsate is a violation of federal law. If these wastes cannot be disposed of by use according to label instructions, contact your state pesticide or environmental control agency or the hazardous waste representative at the nearest EPA regional office for guidance.

### CONTAINER DISPOSAL

Nonrefillable container. Do not reuse or refill this container. Triple rinse container (or equivalent) promptly after emptying. Triple rinse as follows: Empty the remaining contents into application equipment or a mix tank. Fill the container 1/4 full with water. Replace and tighten closures. Tip container on its side and roll it back and forth, ensuring at least one complete revolution, for 30 seconds. Stand the container on its end and tip it back and forth for the several times. Empty the rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Repeat this procedure two more times. Then offer for recycling, if available, or offer for reconditioning, if appropriate, or puncture and dispose of in a sanitary landfill, or incineration, or if allowed by state and local authorities, by burning. If container is burned, stay out of smoke.

**ACCIDENTS: In case of a major spill of AERIS™ Seed-Applied Insecticide/Nematicide  
TELEPHONE (24 HOURS A DAY) IN THE U.S.A. 1-800-334-7577.**

# WARRANTY STATEMENT

## IMPORTANT: READ BEFORE USE

Read the entire Directions for Use, Conditions, Disclaimer of Warranties and Limitations of Liability before using this product. If terms are not acceptable, return the unopened product container at once.

By using this product, user or buyer accepts the following Conditions, Disclaimer of Warranties and Limitations of Liability.

**CONDITIONS:** The directions for use of this product are believed to be adequate and must be followed carefully. However, it is impossible to eliminate all risks associated with the use of this product. Crop injury, ineffectiveness or other unintended consequences may result because of such factors as weather conditions, presence of other materials, or the manner of use or application, all of which are beyond the control of Bayer CropScience. All such risks shall be assumed by the user or buyer.

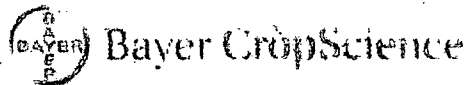
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## NET CONTENTS:

\* TEMIK is a registered trademark of Bayer.

PRODUCED FOR



**Bayer CropScience LP**  
**P.O. Box 12014, 2 T.W. Alexander Drive**  
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**1-866-99BAYER (1-866-992-2937)**

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